

TRIP REPORT
FOR
AT&T
NORTH ANDOVER, MASSACHUSETTS



SEMS DocID

630202

CERCLIS NO. MAD982547317

SITE INSPECTION
RESPONSE ACTION CONTRACT (RAC), REGION I

Prepared for:

U.S. Environmental Protection Agency
Region I
Office of Site Remediation and Restoration
Boston, MA 02114-2023

EPA CONTRACT NO. 68-W6-0045
EPA WORK ASSIGNMENT NO. 032-SISI-01ZZ

TtNUS PROJECT NO. N0073-1800
TtNUS DOCUMENT NO. RI00534

Submitted by:

Tetra Tech NUS, Inc.
55 Jonspin Road
Wilmington, MA 01887

June 2000



**EPA REGION I SUPERFUND PROGRAM
TRIP REPORT**

Inspection Information

Site Name: AT&T

Address: 1600 Osgood Street

Town: North Andover

CERCLIS No.: MAD982547317

State: Massachusetts

Task No.: N0073-1800

Date of On-Site Reconnaissance: September 29, 1999

Time of On-Site Reconnaissance: 0900 to 1230 hours

Weather Conditions: Cloudy, 69°F

Date of Sampling Trip: April 11, 2000

Time of Sampling Trip: 0800 to 1300 hours

Weather Conditions: Sunny, 46°F

Site Status at Time of Inspection:

☒ **ACTIVE**

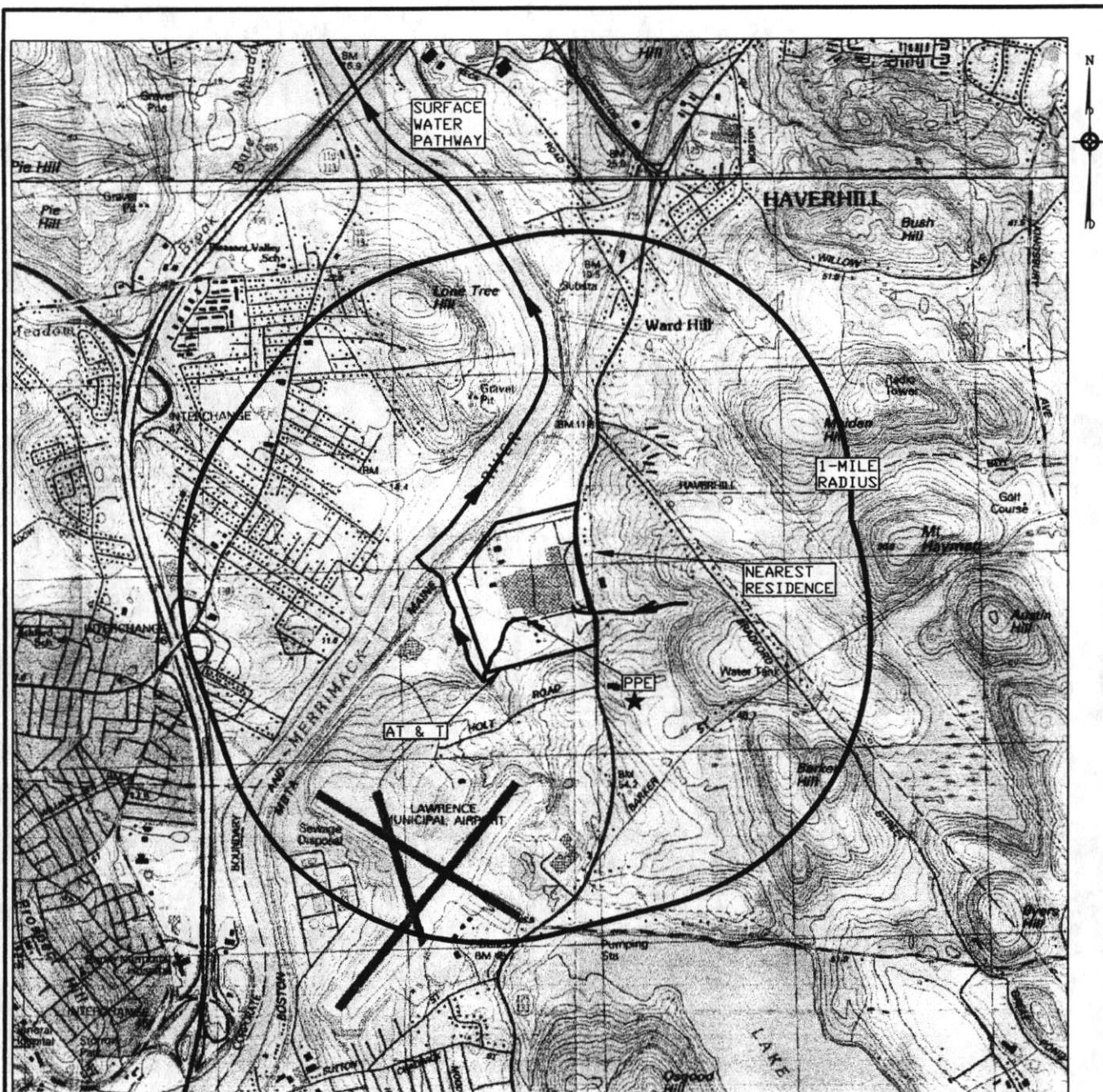
☐ **INACTIVE**

☐ **ABANDONED**

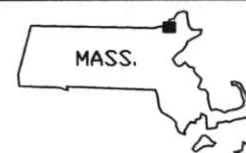
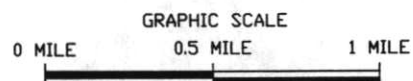
Comments:

The AT&T property is located at 1600 Osgood Street (Route 125) in North Andover, Essex County, Massachusetts. Geographic coordinates as measured from the center of the property are latitude 42° 43' 54.1" north and longitude 71° 06' 58.9" west (Figure 1). The property is currently owned and operated by Lucent Technologies Optical Networks Group (Lucent). The 168-acre property is characterized as 115 acres developed, 40 acres woodlands, 5 acres wetlands, and 8 acres floodplain (Figure 2).

AT&T is bound to the east by Osgood Street (Route 125), to the north and northwest by a Boston and Maine Railroad easement and then the Merrimack River, and to the south and southwest by an unnamed river and the Holt Road Landfill. In 1956, the AT&T Merrimack Valley Works (AT&T) facility was constructed on former farm land. Information pertaining to the owners of the property prior to 1956 were not included in available file information. From 1956 to 1996, the AT&T property was used to manufacture telecommunication transmission equipment. In 1996, the property was purchased by Lucent and manufacturing operations on the property ceased. Since 1996, Lucent has used the facility to design, test, and assemble telecommunication transmission equipment.



BASE MAP IS A PORTION OF THE FOLLOWING 7.5 X 15 MINUTE USGS QUADRANGLES:
HAVERHILL, MASSACHUSETTS-NEW HAMPSHIRE, 1987;
LAWRENCE, MASSACHUSETTS-NEW HAMPSHIRE, 1987.



QUADRANGLE LOCATION

SITE LOCUS

AT & T

NORTH ANDOVER, MASSACHUSETTS

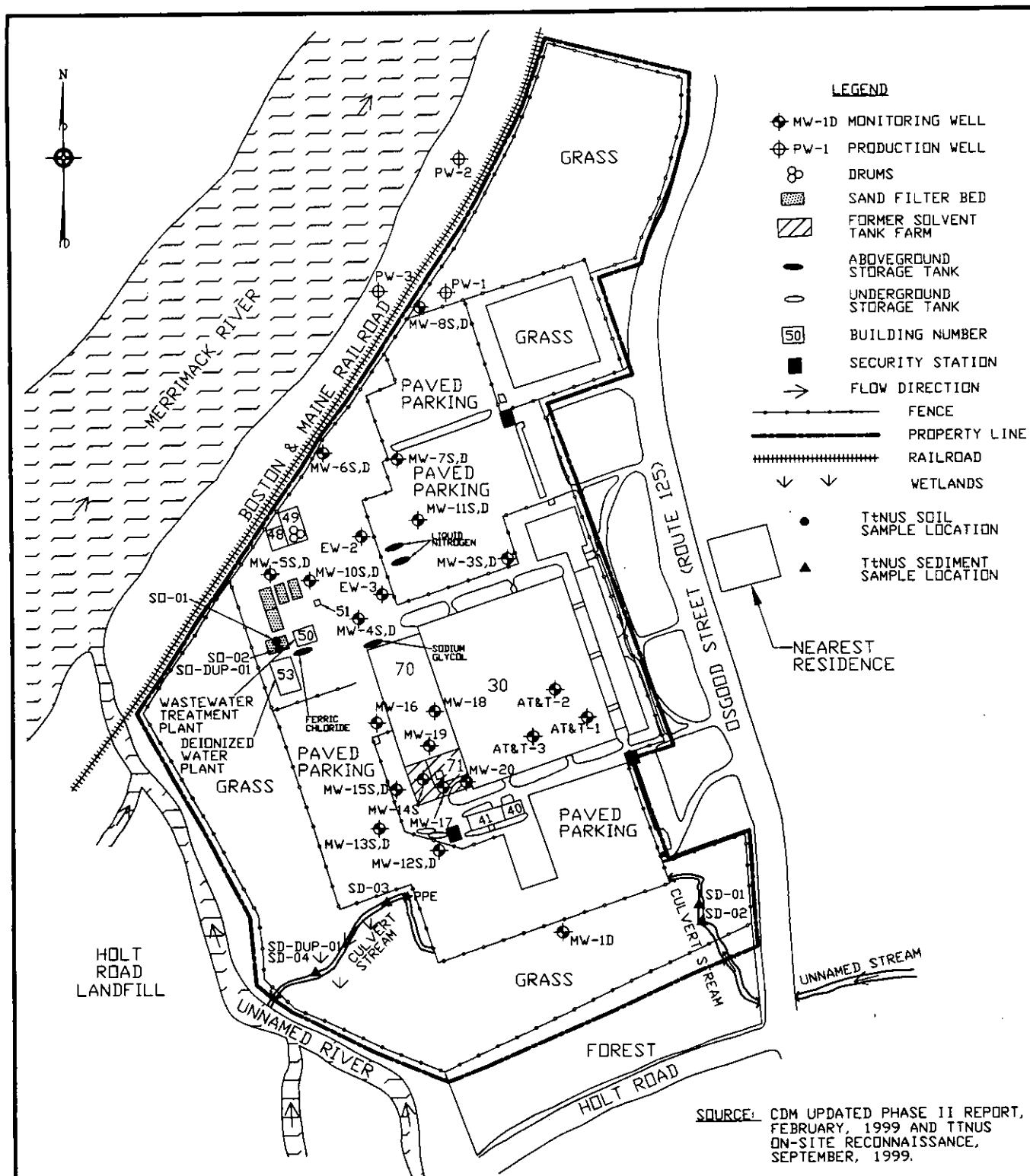
DRAWN BY:	D.W. MACDOUGALL	REV.:	0
CHECKED BY:	D. GORDEN	DATE:	JUNE 1, 2000
SCALE:	AS NOTED	ACAD NAME:	DWG\SI\1800\FIG_1.DWG

FIGURE 1



TETRA TECH NUS, INC.

55 Jonspin Road Wilmington, MA 01887
(978)658-7899



SITE SKETCH

AT & T

NORTH ANDOVER, MASSACHUSETTS

DRAWN BY:	D.W. MACDOUGALL	REV.:	1
CHECKED BY:	D. GORDEN	DATE:	JUNE 19, 2000
SCALE:	NOT TO SCALE	ACAD NAME:	DWG\SI\1800\FIG_2.DWG

FIGURE 2



TETRA TECH NUS, INC.

55 Jonspin Road Wilmington, MA 01887
(978)658-7899

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Personnel Performing Inspection

<u>Agency/Organization</u>	<u>Names</u>	<u>Program</u>
() EPA Region I:		
(✓) EPA Region I Contractor:	David Gorden Derek McClellan Courtney Moore Amy Putnam	Dynamac Corporation Dynamac Corporation Nobis Engineering, Inc. Tetra Tech NUS, Inc.
() State:		
(✓) Other:	Anthony Makovitch Peter Bajor Peter Connolly William Swanson	Lucent Technologies Lucent Technologies Camp Dresser & McKee Camp Dresser & McKee

Site Ownership-Current Owner

Name:	Lucent Technologies Optical Networks Group c/o E.F. Newland, Jr.	Telephone: (978) 960-3311
Address:	1600 Osgood Street, North Andover, Massachusetts 01845	

Site Visit: Brief Chronology

On-site Reconnaissance: September 29, 1999

TtNUS team personnel met and interviewed Anthony Makovitch (Lucent Technologies), Peter Bajor (Lucent Technologies), Peter Connolly [Camp Dresser & McKee (CDM)], and William Swanson (Camp Dresser & McKee). TtNUS team personnel toured the exterior of the buildings, the accessible interior of buildings, and the perimeter of the property. TtNUS team personnel noted potential sources at the property, the condition of the property and associated buildings, the number of on-site employees, evidence of trespassers, a culverted stormwater drainage system, the location of sensitive environments and receptors, abutting property use, the distance to the nearest residence, and potential sample locations.

Sampling: April 11, 2000

TtNUS team personnel arrived at the AT&T property and met with Anthony Makovitch and Peter Connolly. TtNUS team personnel collected three soil/source samples from two cells of one on-site industrial waste water sand filter bed and five sediment samples from an unnamed stream. Quality assurance/quality control samples were collected and submitted to a Delivery of Analytical

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Site Visit: Brief Chronology

Services laboratory. The samples were analyzed for volatile organic compounds, semivolatile organic compounds, pesticides, polychlorinated biphenyls, metals, and cyanide.

Site Characteristics

Quantities / Extent / Details

() Cylinders:

(✓) Drums: Approximately 12 55-gallon drums containing hazardous waste were located inside Building 49.

() Lagoons:

(✓) Tanks: **(✓) Aboveground:** One 6,000-gallon ferric chloride aboveground storage tank (AST) was located south of Building 50, one 6,000-gallon sodium glycol AST was located north of Building 70, and two liquid nitrogen ASTs (30 feet (ft) tall and 10 ft in diameter) were located north of Building 30.

(✓) Below Ground: One 6,000-gallon gasoline underground storage tank (UST) and one 2,000-gallon diesel UST were located west of Building 41.

() Asbestos:

() Piles:

() Stained Soil:

() Sheens:

() Stressed Vegetation:

() Landfill:

() Leachate Seeps:

(✓) Population in Vicinity: Approximately 8,376 people, including on-site workers, are located within 0.25-radial mile of the property.

(✓) Distance to Nearest Residence: The nearest residence is located approximately 100 feet east of the AT&T property.

(✓) Land use: **(✓) Industrial** **() Commercial** **() Residential**

() Rural **() Agricultural**

(✓) Wells: **() Drinking:**

(✓) Monitoring: TtNUS team personnel observed several wells throughout the property, including two extraction wells and monitoring wells located inside Buildings 30, 70, and 71. All the wells were capped and appeared to be in good condition. CDM collected groundwater samples from on-site monitoring wells. Analytical results indicated four VOCs. In December 1995, CDM collected additional groundwater samples from on-site monitoring wells. Analytical results indicated seven VOCs. There are production wells on the property; however, they are no longer active.

(✓) Other: Four uncovered sand filter beds, each approximately 1,800 square feet and located north-northwest of Building 50, were used for sanitary waste water treatment. A fifth uncovered sand filter bed, approximately 1,800 square feet and located west of Building 50, was used for industrial waste water treatment. The sand filter beds were not overgrown with vegetation. The waste water plant is expected to be shut down by October 1, 2000.

On-site/Off-site Receptors

Comments/Details

(✓) **Drinking Water:** (✓) The North Andover Health Department indicated that there are private drinking water wells in North Andover; however, they could not provide the locations of these wells. Based on CENTRACTS data, the nearest private well is located between 0.25-radial and 0.5-radial miles from the property. An estimated 2,364 people within 4-radial miles of the property are served by groundwater sources.

(✓) **Municipal:** Approximately 220 people are served by municipal groundwater supplies within 4-radial miles of the AT&T property.

(✓) **Groundwater:** Groundwater flows in a northwesterly direction towards the Merrimack River. The depth to groundwater ranges from 9 to 25 ft below ground surface (bgs) across the AT&T property.

(✓) **Restricted Access:** AT&T is surrounded by a maintained chain-link fence with barbed wire. Three guarded gates provide vehicular and pedestrian access to the property; however, access is restricted to security card holders only.

(✓) **Population in Proximity:** An estimated 6,211 people, including on-site workers, are within 0.25-radial mile of the AT&T property. An estimated 8,376 people, including on-site workers, are within 1-radial mile of the AT&T property.

(✓) **Sensitive Ecosystem:** Approximately 0.8 acres of wetlands are located on the AT&T property. Two state threatened species, two state endangered species, and approximately 387 acres of wetlands are located within 4-radial miles of AT&T. There are two State endangered species, three State threatened species, and one Federal threatened species, and 2.5 miles of wetland frontage along the 15-mile downstream pathway from the AT&T property.

(✓) **Other:** An unnamed stream enters the AT&T property from the east, is culverted beneath the southern parking area, and re-emerges before flowing into an unnamed river. The unnamed river, which receives overland flow from the adjacent Holt Road Landfill, empties into the Merrimack River.

Site Concerns

An on-site reconnaissance was conducted at the AT&T property on September 29, 1999. TtNUS team personnel noted the following 10 buildings on the property: the manufacturing facility (Building 30), power plant (Building 41), garage (Building 40), receiving warehouse (Building 71), shipping warehouse (Building 70), air stripper remediation system (Building 51), deionized water (Building 53), waste water treatment plant (Building 50), hazardous waste storage area (Building 49), and the former chemical storage area (Building 48). The former chemical storage area building was undergoing renovations, and according to Lucent representatives, will be converted to a manufacturing shop. TtNUS team personnel observed four sanitary waste water sand filter beds and an industrial waste water sand filter bed, each approximately 30 ft by 60 ft, north and west of Building 50. Lucent representatives informed TtNUS team personnel that the filter beds are currently only used in emergency situations.

There were approximately 12 55-gallon drums of hazardous waste in Building 49. Lucent representatives informed TtNUS team personnel that the hazardous waste generated at the facility includes rags saturated with isopropanol, solder paste, and waste oils.

Site Concerns (concluded)

TtNUS team personnel observed a 6,000-gallon ferric chloride AST south of Building 50 and a 6,000-gallon sodium glycol AST north of Building 70. According to Lucent representatives, the sodium glycol AST was decommissioned and is in the process of being cleaned and removed from the property. There were two liquid nitrogen ASTs on the property each approximately 30 ft tall and 10 ft in diameter, which according to Lucent representatives are owned by BOC Gas.

An unnamed stream which flows along the southeastern border of the property, is culverted beneath the property prior to emerging along the southwestern property border. The culverted stream enters into an off-site unnamed river and then flows into the Merrimack River. Topography at the AT&T property is flat. Surface water run-off at the property flows into a number of catch basins located throughout the property. According to Lucent representatives, on-site catch basins discharge into the unnamed culverted stream on the southwestern portion of the property.

The property is surrounded by a chain link fence and each entrance gate has a security station. The areas surrounding the buildings are paved and used for parking. There is a grass covered area between the fence and the parking areas on the south, southwestern, and northern portions of the property. The nearest residence to the property is located approximately 100 ft to the east on Osgood Street (Route 125). TtNUS team personnel did not observe any stressed vegetation or stained soils on the AT&T property. TtNUS team personnel observed several wells throughout the property, including two extraction wells and monitoring wells located inside Buildings 30, 70, and 71. CDM collected groundwater samples from on-site monitoring wells. Analytical results indicated four VOCs. In December 1995, CDM collected additional groundwater samples from on-site monitoring wells. Analytical results indicated seven VOCs.

On April 11, 2000, TtNUS team collected three soil/source samples from two cells of one on-site industrial waste water sand filter bed and five sediment samples from the unnamed stream. Table 1 summarizes the source/soil and sediment sample locations collected by TtNUS team personnel. All sampling activities were conducted in accordance with the approved Task Work Plan, dated March 2000, with the exception of the following:

- soil sample locations SS-01, SS-02, SS-03, SS-DUP-01, and SS-04 were not collected due to field condition changes
- sediment sample locations SD-05, SD-06, and SD-07 were not collected due to field condition changes
- sediment sample location SD-04 was moved to a location approximately 1,200 feet downstream of the probable point of entry
- SO-01 was collected from the industrial waste water sand filter bed rather than from the sanitary waste water sand filter bed

Report prepared by: David Gorden

Affiliation: Dynamac Corporation

Date: June 21, 2000

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Table 1

Sample Summary: AT&T
Source and Sediment Samples Collected by TtNUS Team Personnel on April 11, 2000

Sample Location No.	Traffic Report No.	Time (hours)	Grab/ Composite	Sample Depth (Inches)	GPS Data (Latitude/ Longitude)	Sample Information
MATRIX: Soil/Source						
18-SO-01 MS/MSD	DO1205	1108	Grab	0 to 24	42° 43' 53.5" N 71° 07' 11.2" W	Soil/source sample collected from the industrial waste water sand filter bed west of Building 50. Sample appeared to be tan sand with red/purple sand at ~2 feet; PID = 0.
18-SO-02	DO1206	1120	Grab	0 to 24	42° 43' 53.5" N 71° 07' 11.2" W	Soil/source sample collected from the industrial waste water sand filter bed west of Building 50. Sample appeared to be black/dark brown sand (0 to 4 inches) over tan sand; PID = 0.
18-SO-DUP-01	DO1207	1127	Grab	0 to 24	42° 43' 53.5" N 71° 07' 11.2" W	Duplicate of 18-SO-02, collected for quality control.
MATRIX: Sediment						
18-SD-01 (Background)	DO1203	1021	Grab	0 to 6	42° 43' 41.9" N 71° 06' 48.1" W	Reference sediment sample collected in the unnamed stream at the southeast corner of the property. Sample appeared to be olive brown sandy loam; PID = 0.

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18-SD-02 (background) (metals only)	DO1204	1030	Grab	0 to 6	42° 43' 41.6" N 71° 06' 48.1" W	Reference (metals only) sediment sample collected in the unnamed stream at the southeast corner of the property. Sample appeared to be black to olive brown sandy loam; PID = 0.
18-SD-03 MS/MSD	DO1202	0950	Grab	0 to 6	42° 43' 41.7" N 71° 07' 06.1" W	Sediment sample collected in the unnamed culverted stream, ~300 feet downstream of the PPE. Sample appeared to be olive green sandy loam with ~1-millimeter diameter pebbles; PID = 0.
18-SD-04	DO1200	0929	Grab	0 to 6	42° 43' 38.8" N 71° 07' 11.1" W	Sediment sample collected in unnamed culverted stream ~900 feet downstream from SD-03 and ~1,200 feet downstream of the PPE. Sample appeared to be black fine silty loam; PID = 0.
18-SD-DUP-01	DO1201	0916	Grab	0 to 6	42° 43' 38.8" N 71° 07' 11.2" W	Duplicate of 18-SD-04, collected for quality control.

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MATRIX: Aqueous						
18-RB-01	DO1208	1144	Grab	NA	NA	Soil or sediment sampling equipment rinsate blank.
18-TB-01	DO1209	0850	Grab	NA	NA	Methanol trip blank for quality control
18-TB-02	DO1210	0855	Grab	NA	NA	Sodium bisulfate trip blank for quality control.
18-TB-03	D01216	0900	Grab	NA	NA	Hydrochloric acid trip blank for quality control.

MS/MSD = Matrix Spike/Matrix Spike Duplicate
 NA = Not applicable
 ~ = Approximately
 PID = Photoionization Detector
 GPS = Global Positioning System